REMARKS/ARGUMENTS

Claims 23-35, 39-41 and 43-45 are present in this application.

Claims 23, 24, 26, 27, 29, 32, 35, 39 and 43 were rejected under 35 U.S.C. §102(b) over U.S. Patent No. 5,397,332 to Kammerer et al. This rejection is respectfully traversed.

Claim 23 defines an applicator assembly comprising five elements: a laparoscopic port, a deployment sleeve, a plunger, a sheet of surgical material and an actuating means. The deployment sleeve passes down the laparoscopic port, and the plunger is located within the sleeve. The sheet of surgical material (which can be folded or collapsed) is located at and fully within the distal end of the deployment sleeve.

Kammerer discloses an applicator assembly in which an inner tube 102, which acts as a deployment tube, is telescopically received within a larger, outer tube 100 which acts as an outer delivery tube. The push rod 106 extends along the coaxial bore of the inner and outer tubes 100, 102. By moving this push rod 106 relative to the inner tube 102 it is possible, when the spreader tip 60 is displaced distally beyond the distal tip of the outer tube 100, to expand a piece of surgical mesh 65 provided around the spreader tip 60.

In the Office Action, in raising the lack of novelty objection based on Kammerer, the Examiner equates the outer tube 100 of Kammerer with the "laparoscopic port" of present claim 23, the inner tube 102 of Kammerer with the "deployment sleeve" of present claim 23 and the push rod 106 of Kammerer with the "plunger" of present claim 23. In doing so, however, the Examiner overlooks that claim 23 of the present application requires the sheet of surgical material to be "for location at and fully within the distal end of the deployment sleeve". If, as the Examiner alleges, the inner tube 102 of Kammerer is equivalent to the claimed "deployment sleeve," this condition of claim 23 is not fulfilled. Nowhere in Kammerer is it disclosed that the

sheet of surgical mesh 65 is capable of being located "at and fully within" the distal end of Kammerer's inner tube 102. In fact, the opposite is true. As shown in Fig. 5 of Kammerer, which depicts the Kammerer device in its loaded, pre-delivery condition, the piece of surgical mesh 65 (visible in Fig. 6, rather than in Fig. 5) provided over the spreader tip 60 is positioned distally of the distal end of the inner tube 102.

Firstly, this much is clear from Fig. 6 when read in conjunction with how the surgical applicator 50 is loaded, which is described in the paragraph beginning at line 45 of column 9 of Kammerer. This explains how, starting with the Fig. 23 arrangement, the surgical mesh 65 "is pushed into the delivery tube 100 and folded over the spreader tip 60 by the funnel-shaped flange 152. The spreader tip 60 and surgical mesh 65 advance distally by sliding the deployment tube 102 and the push rod 106 along the delivery tube until the spreader 60 is stopped in a retracted position (Fig. 5) inside the distal end of the delivery tube."

Secondly, the surgical mesh 65 provided on the collapsed spreader tip 60 can never be "located at and fully within the distal end of" the inner tube 102, because of the way that the spreader tip 60 is mounted on the distal extremity of the inner tube 102. This is because the first retainer 64 provided at the proximal end of the spreader tip 60 is said to be "secured" to the distal end of the deployment tube 102 (lines 3-7 of column 8 of Kammerer). Because the sheet of surgical material 65 of Kammerer is never located at and fully within the distal end of the inner tube 102, the spreader tip 60 of Kammerer is incapable of unfolding or erecting that sheet of surgical material "following expulsion of the sheet of surgical material from the distal end of the deployment tip," because the sheet of surgical material is never positioned within the distal end of the deployment sleeve so as ever to be capable of expulsion therefrom.

Since at least these features of the claimed invention are lacking in Kammerer, Applicant respectfully submits that the rejection is misplaced.

With regard to the dependent claims, Applicant submits that these claims are allowable at least by virtue of their dependency on an allowable independent claim.

Reconsideration and withdrawal of the rejection is respectfully requested.

Claims 23-25, 28, 30, 31, 33, 34, 41, 44 and 45 were rejected under 35 U.S.C. §103(a) over U.S. Patent No. 5,397,331 to Himpens et al. in view of Kammerer et al.

As discussed previously, "claim 23 defines a deployment sleeve for passing down a laparoscopic port and a plunger for location within that sleeve." A plunger is thus located within the deployment sleeve, and the sleeve is locatable within a laparoscopic port. Claim 23 additionally recites that the sheet of surgical material is located within the distal end of the deployment sleeve, i.e., within the middle of the three noted structures (plunger, deployment sleeve, laparoscopic port).

The Office Action references the trocar sheath 23 of Himpens as equivalent to the claimed "deployment sleeve" and the tube 20 of Himpens to be equivalent to the claimed "plunger." This conclusion, however, as discussed during the prior interview, is a mis-characterization of the Himpens patent. Himpens describes that the trocar sheath 23 is "percutaneously passed through the abdominal wall" with the patient (see column 5, lines 62-65). As such, the trocar sheath 23 in Himpens is more appropriately equivalent to the "laparoscopic port," in that it is the rigid element that is inserted through the incision in the abdominal wall to provide access to the peritoneal cavity.

Claim 23 defines the three part structures including a laparoscopic port, a deployment sleeve for passing down the laparoscopic port, and the plunger for location within the sleeve.

Himpens lacks at least the claimed deployment sleeve passing down the laparoscopic port. During the prior interview with the Examiner, the Examiner seemed to agree that this feature of the invention appeared to be distinguishable from the Himpens patent.

Despite this, the Examiner has raised the same sort of objection, this time combining the Himpens disclosure with that of Kammerer, arguing that Kammerer "discloses a laparoscopic port 100 and an external flange 122 defining an insertion stop for the deployment sleeve in the laparoscopic port to control the length of insertion of the deployment sleeve in the laparoscopic port." The Office Action concludes that it "would have been obvious . . . to modify the device of Himpens et al with the port and flange of Kammerer et al in order to facilitate the repeated insertion and removal of the device." Applicant respectfully disagrees.

Firstly, Kammerer does not disclose anything (let alone a "deployment sleeve" as defined in claim 23) as being provided with an external flange defining an insertion stop for the deployment sleeve in the laparoscopic port to control the length of insertion of the deployment sleeve in the laparoscopic port. The Examiner equates this with the annular delivery flange 122 of Kammerer. This flange does not, however, control the length of insertion of Kammerer's inner tube 102 within the outer tube 100. This is clear from considering Figs. 5 and 6, in which this delivery flange 122 is shown as being butted up against the back surface of the latch ring 112 in both Figs., in which Figs. the depth of insertion of the inner tube 102 within the outer tube 100 is different.

Secondly, Applicant submits that those of ordinary skill would NOT have been motivated to modify the Himpens disclosure so as additionally to provide a further integer in the form of a laparoscopic port externally of the guard tube 23 of Himpens. Such modification would serve no useful purpose, in that the exterior of the guard tube 23 is already in contact with the faces of the

incision made within the abdominal wall 24, 25. There would be no benefit in terms of having an additional element positioned coaxially with and externally of the guard tube 23.

Applicant thus respectfully submits that the rejection is misplaced.

With regard to the dependent claims, Applicant submits that these claims are allowable at least by virtue of their dependency on an allowable independent claim.

Reconsideration and withdrawal of the rejection is respectfully requested.

Claim 40 was rejected under 35 U.S.C. §103(a) over Kammerer et al. in view of "optimization of ranges." Without conceding this rejection, Applicant submits that claim 40 is allowable at least by virtue of its dependency on an allowable independent claim. Withdrawal of the rejection is requested.

In view of the foregoing remarks, Applicant respectfully submits that the claims are patentable over the art of record and that the application is in condition for allowance. Should the Examiner believe that anything further is desirable in order to place the application in condition for allowance, the Examiner is invited to contact Applicant's undersigned attorney at the telephone number listed below.

Prompt passage to issuance is earnestly solicited.

The Commissioner is hereby authorized to charge any deficiency, or credit any overpayment, in the fee(s) filed, or asserted to be filed, or which should have been filed herewith (or with any paper hereafter filed in this application by this firm) to Deposit Account No. 14-1140.

Respectfully submitted,

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